

Crabs weighing 150–175 g/pc are placed in cages made of bamboo matting lined with nets at the bottom to prevent their escape during culture. The culture area recommended is a 480-m² pond divided into four units (120 m²/unit).

A cage measuring 0.68 x 1.37 x 0.22 m is divided into 18 cubicles with each cubicle stocked with a crab. Supplemental feeding is given twice daily (early morning and late afternoon) at 5% of the crab's average body weight. Feeds include trash fish, "kuhol" and mussel meat. Small crustaceans, animal entrails, kitchen leftovers, and grilled coconut meat are sometimes given. Fattening usually lasts for 10–15 days or when the crab reaches 250–350 g/pc.

The peak season for harvesting and marketing of fattened mudcrabs is from August to April of the following year while the lean season is from May to July.

Harvesting of Mudcrabs in Ponds

Using the "pasulang" method, the pond water is partially drained during low tide and then water is admitted at high tide to cause the milkfish and mudcrabs to swim against the current towards the catching area. While swimming against the current and concentrating along the gate, the crabs are caught with scoop nets and their pincers are securely tied with coconut sheath ('suwak') or plastic straw. Large-sized crabs and milkfish are usually caught first. The remaining stocks in the pond are collected by total drainage. Complete recovery of crabs particularly for those which burrow into the mud lasts for 1–2 days and is done by farm workers.

Another harvesting method is the partial or selective harvesting of crabs at spring tide after 45–60 days of culture. Most of the catch are usually females with maturing eggs ('aligue') or at the spawning stage. Baited traps ('bintol') or baited hand lines are used if selective harvesting is done at ebb or neap tide. This method thins out the cultured stock and minimizes competition for food and space. It also reduces cannibalism and promotes faster growth of the smaller ones. Partial harvesting is done every 15 days thereafter, until total harvest.

Source:

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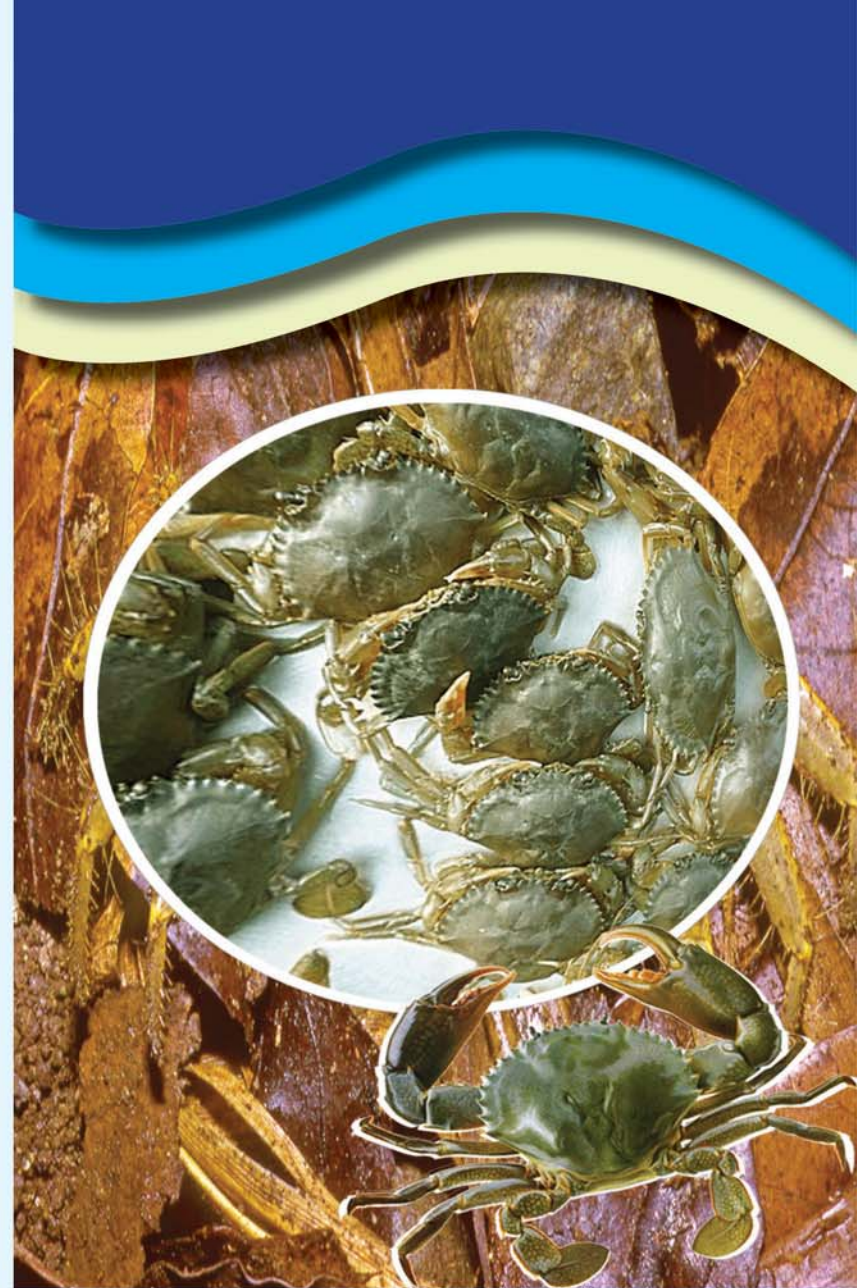
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Mudcrab Culture

Mudcrab Species for Culture

The mudcrab is the most important crab for culture in the Philippines. It is also known as the serrated swimming crab or mangrove crab because it inhabits muddy bottoms, mangrove areas and river mouths. It is widely found in Asia and the Indo-Pacific Region.

Mudcrabs belong to the genus *Scylla* which has at least three known species in the Philippines – *Scylla serrata* Forsskal 1775; *S. oceanica* Dana 1852; *S. tranquebarica* Fabricius 1798 and a variety of *S. serrata* var. *paramamosain*. They are distinguished by color patterns, relative size, spines, chromosome form, gamete development, and preferred habitats.

The classification of mudcrabs in the Philippines is still uncertain. Red, green, brown, and spined species are found in various parts of the country. The most widely caught species is the grayish green or purplish brown *S. serrata*. This is an active and aggressive species characterized by a fan-shaped and smooth carapace with six spines between the eyes.

S. oceanica is commonly called the king crab or 'bulik' in Tagalog and 'manginlawod' in Visayan. It is the largest among the mudcrab species in the country.

Mudcrabs are scavengers and cannibalistic. They prey on small fish, soft-shelled shrimps, clams, and on smaller and weaker crabs. They dig into the mud at low tide and move about in search for food during high tide.



Selecting the Site for Mudcrab Culture

Mudcrab culture can be carried out in brackishwater ponds or cages and pens in mangrove areas, nipa swamps or estuarine shallows which are free from pollutants and where water exchange is good. Water depth should be maintained at 80–120 cm.

In brackishwater ponds, the soil should be sandy clay loam or clay loam with a rich organic matter base. An adequate supply of good quality water all year round coming directly from the sea or tidal water is required. During high tide, the pond area should be filled with water to a depth of at least 60 cm. When drained at neap tide, the pond bottom could be exposed completely. During summer months, a freshwater source may be needed to adjust the pond water salinity to a level favorable for the growth of the cultured species.

For the crab fattening system, a 30-cm depth is recommended to allow checking of the cages. In nearshore locations, the culture site should be protected by reefs or natural barriers from big waves and strong currents. The bottom should be muddy or of soft sand. For cage culture, the bottom should be free from obstacles, such as rocks and stumps.

Source of Mudcrab Seeds

Presently, mudcrab farming is still dependent on the wild for its source of seeds. Mudcrab juveniles, weighing 10–40 g or 5–20 cm carapace breadth, are available throughout the year (with peak during May to September). They are caught in mangrove areas and estuarine waters with gill nets, baited traps ('bintol'), fish traps and hooks, bamboo cages ('panggal' or 'bobo'), scissor nets ('sakag'), baited lines with scoop net, and fish corrals ('baklad').

In the Philippines, crab seeds are abundant in Catarman, Samar; Aparri, Cagayan; Bulan, Sorsogon; Masbate and Camarines Sur. In Panay Island, Barotac Nuevo and Dumangas, Iloilo; Pontevedra, Capiz; and New Washington, Aklan are identified as collecting areas. Other areas include the provinces of Negros Occidental, Camarines Norte, Bataan, Lanao, Zamboanga, and Misamis.

From the source, the crablets are placed in pandan bags with 500–600 pcs/bag for transport to the culture site.

Monoculture of Mudcrabs

In the monoculture of mudcrab, only one species is grown. Crablets weighing 5–20 g each are stocked in ponds at rates of 12,000–15,000 pcs/ha. During culture, water depth in the pond is maintained at 80–120 cm. Feeds in the form of trash fish, mussel meat and shrimp pellets are given 2–3 times daily at a feeding rate of 5% of crab body weight per day. After a culture period of 4–6 months, the male crab weighs 0.7–1.2 kg/pc while the female weighs 0.5–0.7 kg/pc. Average survival rate of crabs ranges from 60 to 80%.

The pond preparation for crab monoculture is the same employed for milkfish and shrimp culture. Harvesting is done through the use of traps or by hand.

Polyculture of Mudcrabs with Milkfish and Shrimps

Another culture method is the multi-species or polyculture of mudcrabs with milkfish and shrimps.

The pond preparation for this method is the same as in monoculture. About 1,500–5,000 crablets are stocked together with 10,000–30,000 shrimp postlarvae per hectare. About 250–350 milkfish fingerlings are stocked one month after. During culture, the water depth, feed and feeding requirements are also followed as in the monoculture method. The culture period lasts for 4–6 months or when the mudcrab weighs 0.7–1 kg/pc and the female weighs 0.5–0.6 kg/pc. Average survival rate of the crabs ranges from 60 to 70%.

At harvest, the shrimps weigh about 30–35 g/pc with survival rates of 70–85% while the milkfish weigh 250–350 g/pc with survival rates of 90–95%.

Mudcrab Fattening

With the frequent occurrence of thin mudcrabs, crab producers resort to fattening them for better prices in the market.